



Contribution ID: 699

Type: **Poster Presentation**

Search for the Lepton Flavour Violating Decay $\Upsilon(3S) \rightarrow e^\pm \mu^\mp$

Charged lepton flavour violating processes are unobservable in the standard model, but they are predicted to be enhanced in several new physics extensions.

Data collected with the BaBar detector at the SLAC PEP-II e^+e^- collider at a centre-of-mass energy of 10.36 GeV were used to search for electron-muon flavour violation in $\Upsilon(3S) \rightarrow e^\pm \mu^\mp$ decays.

The search was conducted using a data sample in which 118 million $\Upsilon(3S)$ mesons were produced, corresponding to an integrated luminosity of 27 fb^{-1} .

Experimental Collaboration

BABAR

Session Classification: Poster session

Track Classification: Flavour Physics and Fundamental Symmetries